



RED RIVER AUTHORITY OF TEXAS



WATER CONSERVATION AND DROUGHT CONTINGENCY PLAN

AS AMENDED

APRIL 2014

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1.0 INTRODUCTION

This comprehensive Conservation and Drought Contingency Plan has been prepared pursuant to the directives of Section 11.1271 through Section 11.1272 of the Texas Water Code and applicable rules of the Texas Commission on Environmental Quality as contained in Title 30, Chapter 288 of the Texas Administrative Code, and comprises the overall conservation policy to be placed into effect by the Authority's Utility Division, together with joint implementation of the Emergency Response Management Program.

1.1 Authority Background and

The Red River Authority of Texas was created in 1959 by Acts of the 56th Legislature as a political subdivision of the state, a body politic and corporate under Article XVI, Section 59 of the Texas Constitution. Article 8280-228 of Vernon's Annotated Texas Civil Statutes (VATCS) enumerates the statutory obligations of the Authority.

The Authority was created as a conservation and reclamation district and charged by the legislature with the optimum development of the water resources within the Red River Basin in Texas for beneficial use by the public. The Authority's Enabling Legislation further enumerates the statutory responsibilities to provide a basin-wide Master Plan for the development and proper management of the water resources, with the principal objective being the conservation of existing water resources to the fullest.

For over 50 years, the Authority has served the public in areas of research, planning, design, permit acquisition, development, treatment and distribution of surface and groundwater; treatment and disposal of municipal and industrial waste, and pollution abatement and control for the environment. As a result of these efforts, the Authority responded to the needs of many rural areas, which were without any dependable source of potable drinking water, by developing a regional rural water supply system hereinafter referred to as the Utility Division.

1.2 The Utility Division

The Utility Division consists of 33 individual rural water supply systems, which serve approximately 10,000 people over a 15-county geographical area. In addition to the water systems, the Utility Division operates two individual wastewater treatment plants and three wastewater collection systems serving approximately 400 people located within the service area. Revenues are generated from an individual system user rate, which is set by the Board of Directors on a cash basis utilizing the system's financial position to determine the revenue needed to recover the actual operating cost and debt services.



No margin of profit or return on invested capital is included in the rate base and each system is required to stand on its own financial integrity. The Authority sold revenue bonds to the state and/or federal government to finance the systems at an original total capital cost of \$8.58 million.

The Utility Division is divided into nine geographical districts, each having a District Manager who operates and maintains the facilities under the direct supervision of the Regional Manager and Assistant General Manager, to provide potable water service directly to approximately 4,000 metered connections each.

1.3 Description of the Service Area

The Authority's primary service area consists of 43 Texas counties lying within the watershed of the Red River Basin. However, the regional service area of the Utility Division is comprised of 15 counties scattered throughout the primary service area. The area served is under the Certificate of Convenience and Necessity #10202. All of the technical, accounting and administrative functions are performed at the headquarters of the Authority in Wichita Falls for the 33 water systems, while the operational and maintenance functions are keyed to a District Manager who is responsible for several systems within the district boundaries, usually one or two counties. Conveyance of data processing, information, engineering assistance and administrative direction is provided through a voice communications network, which covers the Utility Division's entire service area. Potable water service is provided directly to the consumer via a transmission and distribution network of over 2,150 miles of pipeline. Each service connection is metered and recorded monthly to provide utility billing and an accurate database with which to determine the consumptive relationship of the individual system's cost of service and projected water use trends and/or needs. Refer to the Regional Water Supply Facilities map, Figure 1 on the next page, for further description of the service area.

2.0 EVALUATION OF THE UTILITY DIVISION

2.1 The Existing Water Supplies

The Utility Division utilizes water for distribution to the public from three basic sources: surface water, groundwater and water purchased from others. The RRA-Preston Shores Water System (Preston Shores) utilizes raw water from Lake Texoma through surface water permit numbers 4898 and 4899. Water is treated, stored and distributed through Authority owned facilities for service directly to the public via individual metered connections.



Red River Authority of Texas Regional Water Supply Facilities



- | | | | | | |
|------------------------|-----|------------------|-------------------------|-----|--------------------|
| 1. Estelline | 100 | Turkey Estelline | 31. Guthrie | 500 | Guthrie/Dumont |
| 2. Estelline WWTP | 100 | | 32. Pitchfork | 500 | |
| 3. Parnell | 100 | | 33. Guthrie WF | 500 | |
| 4. Ed House | 100 | | 34. Dumont | 500 | |
| 5. 100 Rodriquez | 100 | | 35. Foard City | 510 | Foard City |
| 6. 100 Newlin | 111 | | 36. 510 Johnson | 510 | |
| 7. 112 Harrels Chapel | 112 | | 37. 510 Potts | 510 | |
| 8. 113 L/A Tucker | 113 | | 38. 510 Self | 510 | |
| 9. 113 Smith | 113 | | 39. 510 Smith | 510 | |
| 10. 113 Nimmo | 113 | | 40. 520 Gilliland | 520 | Truscott/Gilliland |
| 11. 113 Taylor | 113 | | 41. 520 Alexander | 520 | |
| 12. 211 N. Goodlett | 211 | | 42. 520 Lowrance | 520 | |
| 13. 213 Quannah SW | 213 | | 43. 600 Clark | 600 | |
| 14. 221 O. Goodlett | 221 | | 44. 600 Lone Mound | 600 | |
| 15. 230 Medicine Mound | 230 | | 45. 600 Abria | 600 | |
| 16. 231 Quannah NE | 231 | | 46. 600 Samnorwood | 600 | Samnorwood |
| 17. 235 Kirkland | 235 | | 47. 600 Lutte | 600 | |
| 18. 300 Lockett | 300 | | 48. 600 Panfork | 600 | |
| 19. 300 Vernon W. | 300 | | 49. 610 Patterson | 610 | |
| 20. 311 Box | 311 | | 50. 611 Hill | 611 | |
| 21. 312 Hinds | 312 | | 51. 611 Montgomery | 611 | Plaska Friendship |
| 22. 313 Farmers Valley | 313 | | 52. 611 Hedley | 611 | |
| 23. 410 Tell | 410 | | 53. 612 Montgomery | 612 | Club Lake |
| 24. 410 Airpport | 410 | | 54. 800 Howardwick | 800 | |
| 25. 412 Cee Vee | 412 | | 55. 811 Greenbelt Lake | 811 | |
| 26. 411 Childress NE | 411 | | 56. 900 Arrowhead Plant | 900 | |
| 27. 412 Said | 412 | | 57. 900 East OH | 900 | |
| 28. 413 Garden Valley | 413 | | 58. 900 ARE Plant | 900 | Lake Arrowhead |
| 29. 902 Ringgold | 902 | | 59. 902 Preston Plant | 902 | |
| 30. 722 Preston OH | 722 | | 60. 722 Preston OH | 722 | Preston Shores |

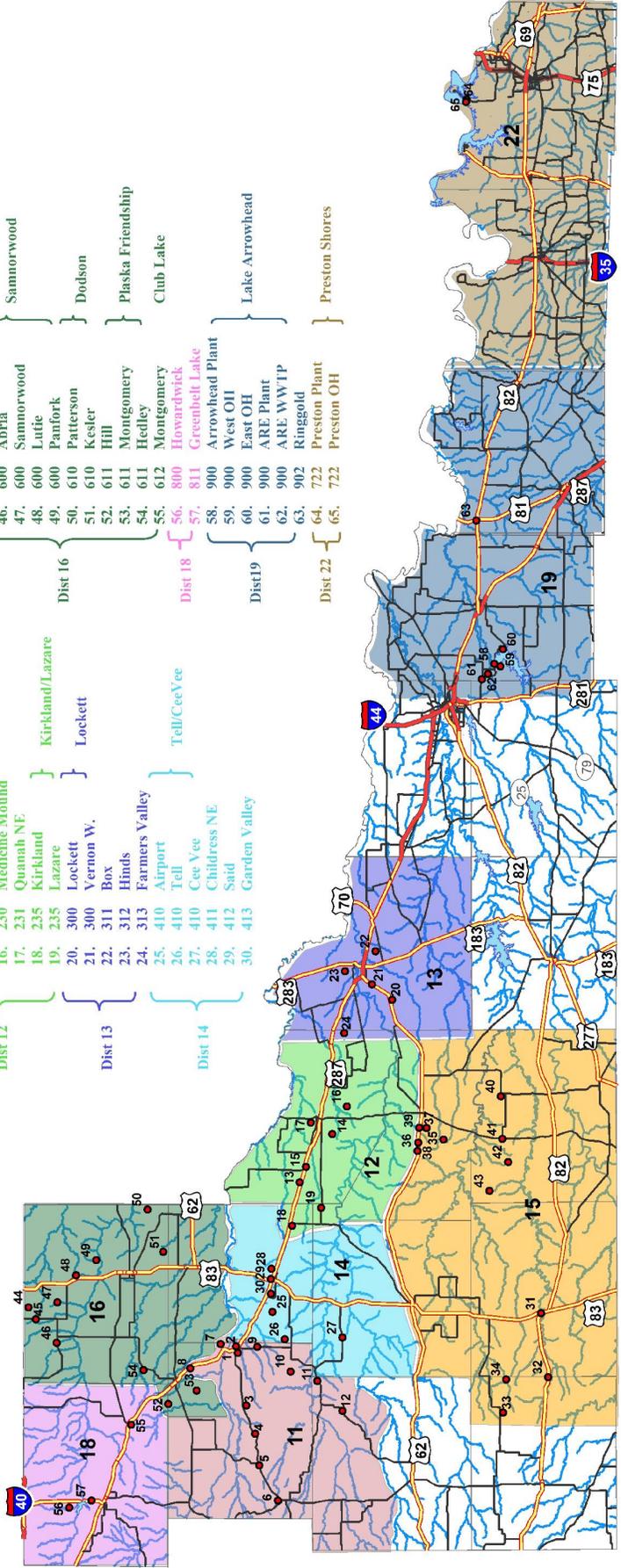


Figure 1



Groundwater is produced from various formations through Authority owned water supply well fields, where it is treated and distributed to the public. Formations range from the Ogallala Aquifer in Donley and Collingsworth Counties, the Alluvium formation in Dickens County, the Seymour Sand in Knox, Hardeman and Wilbarger Counties, and the Trinity Sand Group in Montague County. Water is purchased from others through direct contract for supply from the City of Wichita Falls in Wichita County, the City of Turkey in Hall County, the City of Vernon in Wilbarger County and the Greenbelt Municipal Water Authority in Donley County. Purchased water is then processed and distributed through Authority owned facilities for service to the public.

Water quality control is accomplished by routinely sampling and performing laboratory analysis on all water supplied to the public to ensure public health and compliance with Drinking Water Quality Standards established by statutes of the State and Federal Government. Bacteriological, radiological, chemical and organic samples are submitted for analysis at required intervals to laboratories which are certified and approved by the Texas Commission on Environmental (TCEQ). In addition, daily and/or weekly routine field tests are conducted to ensure that the water served to the public meets the requirements of the TCEQ Rules and Regulations for Public Water Supply Systems.

2.2 Current Water Use Trends and Projected Needs

The Utility Division processes and distributes an average of 550 million gallons each fiscal year, which ends September 30th, throughout the service area of 15 counties. **Table 1** represents a water use trend for all systems within the Utility Division. The projected water requirements, as indicated by the historical records, reflects a fairly consistent level of water consumption on a per capita per day basis. The conservation type rate structure, placed into effect in 1985, was instrumental in the leveling of the water usage by the consumer. Even with the recent dry conditions throughout the service area, the trend of consumer initiated conservation continues to be evident. The overall average per capita per day usage of water sold for the last five (5) years is 118 gallons.



TABLE 1

BENCHMARK WATER USE TREND ANALYSIS
 (Expressed in Millions of Gallons)

DISTRIBUTION		WATER SALES			SOURCES SUPPLIED		
Month	Active Meters	GPCD	Average Day	Total Sold	Produced/ Purchased	Gross Losses	% Losses
October	4003	95	0.947	28.424	47.093	18.669	39.64%
November	3997	90	0.904	27.134	41.826	14.692	35.13%
December	3999	86	0.862	25.862	40.078	14.216	35.47%
January	3966	80	0.799	23.968	39.999	16.031	40.08%
February	3983	60	0.602	18.051	31.021	12.971	41.81%
March	3970	72	0.722	21.663	32.198	10.536	32.72%
April	3983	87	0.869	26.057	36.709	10.652	29.02%
May	3989	128	1.285	38.542	47.033	8.491	18.05%
June	3975	119	1.192	35.769	44.524	8.756	19.67%
July	3975	123	1.234	37.006	52.392	15.385	29.37%
August	3972	140	1.397	41.921	52.829	10.908	20.65%
September	3969	98	0.978	29.332	45.871	16.540	36.06%
Monthly Averages	3982	98	0.983	29.477	42.631	13.154	30.86%
FY 03 – 04	3,890	115	1.151	420.221	593.289	173.070	29.17%
FY 04 – 05	3,878	118	1.180	430.865	609.757	178.890	29.34%
FY 05 – 06	3,960	153	1.528	557.724	726.423	168.700	23.22%
FY 06 – 07	3,954	98	0.976	356.363	538.729	182.370	33.85%
FY 07 – 08	3,992	113	1.129	411.948	578.883	166.940	28.84%
5 Year Averages	3935	119	1.193	435.424	609.416	173.994	28.55%
FY 08 - 09	3,983	117	1.169	426.507	594.816	168.309	28.30%
FY 09 - 10	3,981	114	1.138	415.343	571.370	156.028	27.31%
FY 10 - 11	4,003	147	1.473	537.810	717.647	179.837	25.06%
FY 11 - 12	4,002	117	1.166	425.700	608.680	182.980	30.06%
FY 12 - 13	3,969	97	0.969	353.728	511.573	157.846	30.86%
5 Year Averages	3988	118	1.183	431.818	600.817	169.000	28.13%



2.3 Population Growth Patterns

The regional service area for the Utility Division is principally rural, with farming and ranching as the main industry. The water systems were designed, financed and installed for domestic service to rural areas, which typically did not have any means of providing potable water for this purpose. Although a portion of the service is utilized for livestock, external yard and garden watering, all metered service connections are classified for domestic purposes, unless otherwise stated. Intermittent restricted demand commercial connections are provided where the individual water system can feasibly support the additional demand. In most cases, the restrictions are set to limit the demand to within the normal domestic operating conditions. In addition, a very few restricted demand wholesale connections have been provided to small entities, primarily as emergency inter-connects or for mixing purposes.

2.4 Existing Conservation Practices

There has been reoccurring water shortages in many of the Utility Division's individual water systems in the past, which cause routinely practiced conservation techniques, such as voluntary water curtailment and rationing during peak demand periods and/or drought conditions. The Authority follows individual consumer contact with a letter and media coverage to implement notification with close order monitoring of the affected systems to ensure compliance with any request of this nature.

Routinely, all service connections are restricted by individual contract terms regarding maximum consumption during any 24 hour period to ensure a consistent limitation of the consumers demand placed on the distribution system's pressure plane. Additionally, a conservation oriented rate structure with an increasing block value proportional to the water use trends has been implemented on an individual system basis, which has proven to be a very effective conservation effort with an element of control in the hands of the consumer. Periodical publications and conservation tips are provided the consumer together with individual consumer contact for meter testing and leak detection. The historical results of the conservation practices already in existence within the Utility Division have been attributed to an overall reduction in the annual consumption of water reducing the average per capita per day usage of water sold from 119 gallons (2005 – 2008) to a current 5 year average of 118 gallons per capita per day (2009-2014). Additionally, the per capita per day usage for 2012-2013 was 97 gallons which can greatly be attributed to the drought. Refer back to **Table 1**.



3.0 THE WATER CONSERVATION PLAN

3.1 Water Conservation Goals

The Authority has established water conservation goals based on industry standards, however, experience has proven that rural domestic customers primarily served by the Utility Division are already adapted to conserving water, therefore, the Authority is concentrating its efforts on reducing unaccounted for water loss that is largely due to leaks and/or seeps.

Since the overall gpcd for water sold is so low, over the next 5 years the Authority will be looking at ways to reduce the overall water losses, especially those systems which exceed 30% water loss.

The Authority has determined that the five year average water loss for the Utility Division to be 169 MG; this equates to 46 gpcd. **Table 2** below depicts water conservation goals that the Authority feels are obtainable over the next 5 and 10 year periods:

Table 2
Water Conservation Goals

	5 Year		10 Year	
	GPCD	Total Gallons	GPCD	Total Gallons
Reduction in water losses	5	5,000,000	16	20,000,000

3.2 Education and Information Programs

The Authority acknowledges that an effective water conservation plan significantly benefits the individual consumer and their communities in terms of long-range dependability and cost effective management of the source supply. Acknowledging also that the majority of the Utility Division's customers are well acquainted with self-imposed conservation practices as a direct result of the typically dry and drought contentious environment in which they live. cursory reviews of the water use trends are certainly indicative and supportive of this conclusion. However, to maintain pace with the increased water use trends and focus on long-term benefits of water conservation, the Authority instituted an educational program consisting of prepared literature concerning economical conservation practices which can be implemented in the home, schools and businesses; and presents same in direct mailers to the Utility Division's customers, as well as all public functions of the Authority's involvement pertaining to water related topics. Additionally, the Authority regularly engages in speaking to municipalities, water districts, water supply corporations and civic organizations on specific topics of water conservation and development.



The Authority continues its efforts to educate the general public and other organizations much in the same manner as has been carried out over the last 20 years with a greater emphasis on established effective conservation practices, as suggested through the Texas Water Development Board's Conservation Workshops. The Authority, being a regional water supplier with direct conveyance of water to the individual public, makes available its experience and assistance to coordinate efforts to educate and inform all water users of the benefits of organized water conservation practices through any local government, clubs, civic groups, municipalities and scholastic organizations willing to participate. The Authority supplies the *Major Rivers* program to schools throughout the Authority's service area.

3.3 Conservation Type Rate Structure

The Authority developed an effective conservation oriented rate structure, which is adaptable to most public water supply utilities. Most rate bases are required to be designed to recover the cost of operating and debt services in accordance with the ordinances relating to financing the utility. The increasing demand block type appears to be best suited at generating the required revenues to pay the cost of service, while reducing the overall consumptive demand and elimination of unnecessary uses of water on a more realistic basis that of simple economics. Refer to **Table 3** in the Appendix – Utility Rate Structures.

The Authority proposes to continue utilizing the conservation type rate and promote its use in other utilities through all scheduled speaking engagements and public meetings wherever possible. Information demonstrating the methodology of the Authority's conservation type rate is available to any public water suppliers desiring assistance in formulating a conservation type rate to meet their specific needs.

3.4 Universal Metering and Meter Repair

The availability of current and factual water use information is imperative when attempting to establish any type of conservation practices, especially strategic pricing, which is keyed to water use trends. The strategy of reduced rates for higher volume users has not proven to be of any conservation and very little economic benefit to the utility. The Authority's Utility Division maintains a program of metering all service connections. Each service connection is designed according to the demand required at the location, with respect to class of service. All metered services are tested and calibrated in accordance with manufacturers' recommendations and the Authority's policy relating to size and volume of service.



District Managers test, repair and/or replaces any service meter having reached its full register or otherwise deemed inoperative or inaccurate to plus or minus 5%. The Authority also utilizes a meter replacement program in which meters over 10 years of age are replaced and or rebuilt. Large service and master meters are often sent to the manufacturer for calibrations and/or repairs in order to maintain accuracies. A water use audit is conducted annually by the Authority to provide management with a comprehensive accounting of all water uses at all levels of the Utility Division.

3.5 Leak Detection and Maintenance Program

The Utility Division is constantly engaged in efforts to reduce unaccounted water use or losses; that is, water supplied by the plant, but not sold to the customer or used in normal operations. One of the most effective methods of conserving the available water supply is to reduce the loss of water. The Utility Division operates and maintains over 2,150 miles of transmission and distribution lines over its regional service area, and as such, must continually search for possible line breaks and minor leaks.

An ongoing program of leak detection has been established to make monthly visual checks of customer service connections, fire plugs, flushing valves and pressure reducing valves during meter reading intervals, and daily checks of pumping facilities for any abnormal volume discharges which might indicate a leak. Most frequently occurring water losses in the distribution system occur in the smaller sized mainlines from two inches to six inches in diameter, and is primarily due to minor seeps and leaks undetected for long periods of time. The larger mains, from six inches to 14 inches in diameter, are more quickly located for repair, but usually discharge larger amounts of water during the process. The Authority's established leak detection accounting program compares the master meter accumulation of water pumped to the customer service meter readings totaled to each individual system on a monthly basis. The water losses are further compared to previous history in the same time frame for an accurate indication of operating efficiencies. Abnormal water losses in a given system alert the District Manager to promptly search for indications of line leaks.

3.6 Plumbing Codes for Water Conservation Devices

The adoption of this formal water conservation policy, as amended by the Authority's Board of Directors, for all practical purposes, establishes the necessary controls for the Utility Division to adequately maintain an effective conservation program based on individual system needs and use characteristics. A copy of the Resolution, Exhibit 1, is located in the Appendix. The Authority's Domestic Water Service Contracts include the specific conservation practices or plumbing codes enumerated herein. The water service contracts currently contain stringent conditions relevant to mandatory curtailment during



peak demand periods and restrictions limiting the maximum volume allowable to 10,000 gallons residential and 20,000 gallons commercial during any given 24-hour period under normal conditions. Refer to **Exhibit 2**, Water Service Contracts, contained in the Appendix for details.

3.7 Retrofit Programs to Improve Water Use Efficiency

The Authority is severely limited in that it cannot adopt and enforce a retrofit program principally due to the inability to obtain the necessary data with which to determine whether a retrofit program to improve water use efficiency would be cost effective for the Authority or individual users. However, the Authority continues to promote retrofit programs through education and information programs as a viable method of conserving water use.

3.8 Water Recycling and Reuse

The Authority operates and maintains two wastewater treatment plants (WWTP), however, due to their location and small quantity of discharge, recycling or reuse of wastewater effluent is cost prohibitive at this time.

A recycling program has been established at two water treatment plants that provides reuse of water that would otherwise be considered waste. The Authority implemented this program in 1988 as a demonstration project and continues recycling backwash water as part of its daily operations. Additionally, the reuse of backwash water from surface water treatment facilities is utilized as an integral component of the Authority's public education program and provides a typical example of water conservation in practice.

3.9 Water Conserving Landscaping

This type of conservation program is another in which the Authority, as a regional water supplier, must leave to the individual user and municipalities. However, the Utility Division does offer suggestions to customers concerning landscaping, yard and garden watering, and alternate proven methods of obtaining the desired results, while conserving the water supply and ultimately the cost to the water user. Most of the Utility Division's customers are very well accustomed to utilizing landscaping, which requires less water for mere survival of vegetation under routinely dry conditions. The Authority continues to provide literature on the benefits of water conservation landscaping and low water consuming plants and grasses from the County Extension Agents to aid in the continued effort of promoting such programs.



3.10 Implementation of the Plan and Enforcement

The Authority's water service contracts contain specific terms and conditions which require the user to comply with conservation practices as outlined above and where applicable. The Authority strengthened efforts to promote all outlined conservation practices. It implemented and follows stringent conservation practices and provides documented data in support of the conservation program and results.

4.0 DROUGHT CONTINGENCY PLAN

The regional service area of the Utility Division is extremely vulnerable to drought conditions. Most of the systems within the Utility Division do not have alternate water supply sources and in some cases, the existing source supplies are severely limited to a point where consumption during peak demand periods has caused the use of mandatory curtailments and rationing. This condition is typical of systems dependent upon groundwater for its primary source supply. Due to the economic status of the rural areas served, development of alternative water supplies is cost prohibitive. Therefore, the conservation plan is not only a means to conserve the existing water source supplies, but necessary to prevent major capital expansions based on the extraordinary demands of a few water users. The drought contingency plan, however, is a common practice requirement of effective resource management during any type of emergency condition that may arise, and has proven to be invaluable for the Utility Division.

4.1 Declaration of Policy, Purpose and Intent

In order to conserve the available water supply and protect the integrity of water supply facilities, with particular regard for domestic water use, sanitation, and to protect and preserve public health, welfare, and safety, and minimize the adverse impacts of water supply shortages or other water supply emergency conditions, the Authority hereby adopts the following regulations and restrictions on the delivery and consumption of water.

Water uses regulated or prohibited under this Conservation and Drought Contingency Plan are considered to be non-essential and continuation of such uses during times of water shortages or other emergency water supply conditions constitute a waste of water, which subjects the offender(s) to penalties as defined in this Plan.



4.2 Public Education and Involvement

In addition to the Education and Information Programs described in Section 3.2 of this Plan, the Authority will distribute the Plan to all customers at their request. Additionally, a copy of the Plan will be posted on the Authority's website at www.rra.texas.gov. References to the Plan will be included in all Utility Division Newsletters, Consumer Confidence Reports and special mailings.

Direct mailings to each customer on an affected system, should a Drought Response Stage be initiated, will include which stage is being initiated, the drought response measures being implemented, and the penalties for violation of the measures. Separate mailings will be made as each new stage is initiated and/or terminated.

4.3 Authorization

The Director of Operations, in consultation with the Assistant General Manager/General Manager, is authorized by the Board of Directors to implement the applicable provisions of this Plan to the extent that such implementation is deemed necessary to protect the public health, safety and welfare of the Authority's customers. The Director of Operations, in consultation with the Assistant General Manager/General Manager, shall also have the authority to initiate or terminate drought or other water supply emergency measures as described in this Plan.

4.4 Application

The provisions of this Plan shall apply to all persons, customers, and property utilizing water provided by the Authority's Utility Division. The terms "person" and "customer" as used in the Plan include individuals, corporations, partnerships, associations and all other legal entities.

4.5 Definitions

Aesthetic Water Use: Water use for ornamental or decorative purposes such as fountains, reflecting pools, and water gardens.

Commercial and Institutional Water Use: Water use which is integral to the operations of commercial and non-profit establishments and governmental entities such as retail establishments, hotels, restaurants, and office buildings.



Conservation: Those practices, techniques and technologies that reduce the consumption of water, reduce the waste of water, improve the efficiency in the use of water, or increase the recycling and reuse of water so that a supply is conserved and made available for future or alternative uses.

Customer: Any person, company, or organization using water supplied by the Authority's Utility Division.

Domestic Water Use: Water use for personal needs or for household or sanitary purposes such as drinking, bathing, heating, cooking, sanitation, or for cleaning a residence, business, industry, or institution, or for livestock watering not including Confined Animal Feeding Operations.

Industrial Water Use: The use of water in processes designed to convert materials of lower value into forms having greater usability and value.

Landscape Irrigation Use: Water used for the irrigation and maintenance of landscaped areas, whether publically or privately owned, including residential and commercial lawns, gardens, golf courses, parks, and rights-of-way and medians.

Non-essential Water Use: Water uses that are not essential nor required for the protection of public health, safety, and welfare, including:

- (a) Irrigation of landscaped areas, including parks, athletic fields, and golf courses;
- (b) Use of water to wash any motor vehicle, motorbike, boat, trailer, airplane or other vehicle;
- (c) Use of water to wash down any sidewalks, walkways, driveways, parking lots, tennis courts, or other hard-surfaced areas;
- (d) Use of water to wash down buildings or structures for purposes other than immediate fire protection;
- (e) Flushing gutters or permitting water to run or accumulate in any gutter or street;
- (f) Use of water to fill, refill, or add to any indoor or outdoor swimming pools or Jacuzzi-type pools;



- (g) Use of water in fountains or ponds for aesthetic or scenic purposes except where necessary to support aquatic life;
- (h) Failure to repair a controllable leak(s) within a reasonable period after having been given notice directing the repair of such leaks(s); and
- (i) Use of water from hydrants for construction purposes or any other purposes other than fire fighting and flushing of lines to maintain a potable water supply.

4.6 Emergency Triggering Criteria

The Authority's Utility Division is spread over a large geographical service area (15 counties) and as such, varying climate conditions and related system malfunctions may affect one or more systems while not impacting others. To establish criteria which are effective and consistent during actual emergency conditions, the key prompting factor is the individual system's source water availability and the system's pumping capacities. The systems which utilize water from other sources will adopt the purchase water system's water conservation and drought contingency plan so that uniformity is in place. The emergency triggering criteria in this plan will guide the Authority's systems that have their own source supply which are groundwater wells. The stages set for the triggering criteria will be initiated based on the individual systems decrease of water well pumping capacities. As drought conditions increase the water well static levels will begin to drop, depending on the number of wells in the area, these levels may drop at a higher rate. Therefore Authority personnel will begin monitoring each system's well(s) pumping capacities once a drought condition exists or is recognized as it affects each individual system. Additionally, Authority personnel will begin monthly well static level and draw down rate monitoring to determine if a more precise or reliable method can be developed for future drought plan triggering criteria. For the purpose of this Plan, four stages or categories are identified, which include the monitoring requirements for each:

Stage 1 – Mild Water Shortage Conditions are established when due to low aquifer levels that result in a 20% loss of production capability for a continuous 30-day-period;

Stage 2 – Moderate Water Shortage Conditions are established when due to low aquifer levels that result in a 30% loss of production capability for a continuous 20-day-period;

Stage 3 – Severe Water Shortage Conditions are established when due to low aquifer levels that result in a 40% production capability for a continuous 15-day-period; and



Stage 4 – Extreme Water Shortage Conditions are established when due to low aquifer levels that result in a 50% production capability for a continuous 10-day-period. Thus, individual criteria are established for each water supply system within the Utility Division and are adjusted annually based on the current 5 year historical water use data.

Since each system's water pumping abilities varies from the other, the normal trend must also be established individually, and based on the system's maximum design capacity or any other limiting factor. The normal conditions are determined by calculating individual system's average monthly water pumping over the past five years; then calculate the systems safe yield pumping capacities over a 24 hour period, of which the emergency trigger criteria is based on, as seen by water systems in **Table 7**.

Exhibit 3, located in the Appendix, lists the Authority's water systems that utilize water from a wholesale supplier(s) as their sole source and will adhere to any water use restrictions established by the wholesale supplier(s) to achieve the required reductions in demand, as outlined under the purchase water supplier's independent Drought Contingency Plan.

This technique will give the Authority a tool to better manage and monitor the water systems more independently than other programs in the past. This type of Emergency Response Management Program is not only effective, but essential to the successful operation of the Utility Division.

4.7 Plan Implementation, Termination and Emergency Procedures

The Director of Operations shall monitor water productions and drought conditions and shall determine when a condition(s) warrant initiation or termination of each stage of the Plan. Upon receipt of a detailed report from the Director of Operations on current conditions and evasive measures needed and/or taken, the Assistant General Manager/General Manager will authorize the initiation and/or termination of each stage of the Plan. The stages as described below contain criteria for initiation, termination, water use reduction goals, and emergency operating procedures.

ALERT STAGE 1 – MILD WATER SHORTAGE CONDITIONS

Requirements for Initiation:

- A. System water production capacity drops 20% and remains consistent for a period of at least 60 consecutive days.



Goals:

- A. Raise public awareness.
- B. Achieve up to a 20% reduction in demand.

Emergency Operations Procedures:

- A. The Maintenance Division is placed on 24-hour-standby notice for possible unscheduled emergency repairs and technical support as may be required. The notice remains in effect until such time as the Stage 1 Alert has been rescinded by the Director of Operations.
- B. The District Manager makes one or more daily checks of the facilities and distribution system for leak detection, equipment malfunctions, and excessive consumer water usage.
- D. All customers on the affected system(s) are advised of the prevailing emergency condition by direct mail or telephone and requested to reduce all non-essential water uses as much as possible.

Requirements for Termination:

- A. Stage 1 of the Plan will be terminated at such time as the emergency condition requiring the initiation of Stage 1 is alleviated and the system(s) has maintained normal production levels for at least 5 consecutive days.

ALERT STAGE 2 – MODERATE WATER SHORTAGE CONDITIONS

Requirement for Initiation:

- A. System water production capacity drops by 30% and remains consistent for a period of at least 30 consecutive days.

Goals:

- A. Increase public awareness.
- B. Achieve a 30% reduction in demand.

Emergency Operations Procedures:

- A. The Maintenance Division is placed on 24-hour-alert and prepares to assist the District Manager with troubleshooting and emergency repairs as necessary to meet the imposed consumptive demands.



- B. The District Manager and Maintenance personnel make emergency inspections, as necessary, to locate and remedy any encountered deficiencies in the source supply, treatment and/or distribution of the affected system.
- C. All customers on the affected system(s) are advised of the prevailing emergency condition by direct mail and requested to:
 - 1. Follow schedule for all outside water uses, which include handheld hoses and soaker hoses. No non-essential or aesthetic uses of water.

Requirements for Termination:

- A. Stage 2 of the Plan will be terminated at such time as the emergency condition requiring the initiation of Stage 2 is alleviated and the system's ability to provide potable water service to its customers under the prevailing stabilized demand conditions without repeated service interruptions is maintained for a period of 5 consecutive days. Upon the termination of Stage 2, Stage 1 shall become effective until such time as its criteria have been met.

ALERT STAGE 3 – SEVERE WATER SHORTAGE

Requirement for Initiation:

- A. System water production capacity drops by 40% and remains consistent for a period of at least 20 consecutive days.

Goals:

- A. Inform public of critical situation.
- B. Reduce demand by 40%.

Emergency Operations Procedures:

- A. The Maintenance Division is placed on 24-hour-alert and assigned to assist the District Manager with emergency repairs, as necessary to maintain and/or restore service.
- B. The District Manager and Maintenance personnel make emergency inspections as often as necessary to locate and remedy, where possible,



any encountered deficiencies in the source supply, treatment and distribution of the affected system.

- C. The Regional Manager and District Manager make routine inspections of the customer service connections and distribution system in general, to enforce compliance with the Mandatory Curtailment Order and personally advise residents upon contact of the prevailing emergency conditions.
- D. The Regional Manager and District Manager personally contact all known high water users and places them under a written Curtailment Order for all unessential water use until further notice. He/she further advises the users that violators of the order are subject to a temporary severance of connection and a \$50.00 fine for reinstatement of the service.
- E. Well monitoring data collection should increase to twice a month, around the 1st and 15th.
- F. All customer notifications shall contain, but are not necessarily limited to, the following stipulations:
 - 1. Outside watering will be enhanced by management.
 - 2. Livestock metered customers need to begin looking for alternative supply; if conditions worsen, stage 4 will eliminate all livestock water supply available from the public water system.

Requirements for Termination:

- A. Stage 3 of the Plan will be terminated at such time as the emergency condition requiring the initiation of Stage 3 is alleviated and the system's ability to provide potable water service to its customers under the prevailing stabilized demand conditions without repeated service interruptions is maintained for a period of 5 consecutive days. Upon the termination of Stage 3, Stage 2 shall become effective until such time as its criteria have been met.



ALERT STAGE 4 – EXTREME WATER SHORTAGE

Requirement for Initiation:

- A. System water production capacity drops 50% and remains consistent for a period of at least 10 consecutive days.

Goals:

- A. Inform public of critical and possible hazardous situation.
- B. Reduce demand to a level necessary to maintain public health and safety.

Emergency Operations Procedures:

- A. The Maintenance Division is placed on 24-hour-alert with all personnel leaves cancelled and assigned to assist the District Manager with emergency repairs as necessary to maintain and/or restore service.
- B. The District Manager and Maintenance personnel make emergency inspections as often as necessary to locate and remedy, where possible, any encountered deficiencies in the source supply, treatment and distribution of the affected system.
- C. The Regional Manager and District Manager make routine inspections of the customer service connections and distribution system in general, to enforce compliance with the Mandatory Curtailment Order and personally advise residents upon contact of the prevailing emergency conditions.
- D. Well monitoring data collection will increase to weekly.
- E. All customer notifications shall contain, but are not necessarily limited to, the following stipulations:
 - 1. No outside uses of water until further notice is provided.
 - 2. Stop all livestock watering from the public water system.
 - 3. In the event of a total system failure, the use of an alternate emergency source supply, as may be available by another means of conveyance such as trucks, under rationing conditions as directed by the Director of Operations, and subject to the approval of the Texas Commission on Environmental Quality may be used.



Requirements for Termination:

- A. Stage 4 of the Plan will be terminated at such time as the emergency condition requiring the initiation of Stage 4 is alleviated and the system's ability to provide potable water service to its customers under the prevailing stabilized demand conditions without repeated service interruptions is maintained for a period of 5 consecutive days.

Upon the termination of Stage 4, Stage 3 shall become effective until such time as its criteria have been met.

4.8 Enforcement

Repeated violations of Stage 1 or any violation of Stages 2, 3 and 4 are subject to a temporary severance of connection and a \$50.00 fine for reinstatement of service. Repeated violations of Stage 4 are subject to permanent severance of connection, per the General Manager's authorization, for as long as Stage 4 persists.

4.9 Exemptions and Variances

- A. The Director of Operations, in consultation with the Assistant General Manager/General Manager, may in writing, grant an exemption and/or a temporary variance for existing water uses otherwise prohibited under this Plan if it is determined that the failure to grant such exemption and/or variance would cause an emergency condition adversely affecting the health or sanitation of the public or the person requesting such exemption or variance and if one or more of the following conditions are met:
 - 1. Compliance with this Plan cannot be technically accomplished during the duration of the water supply shortage or other condition for which the Plan is in effect.
 - 2. Alternative methods can be implemented that will achieve the same level of reduction in water use.
 - 3. Wholesale customers will be provided water on a pro-rata basis as provided in Texas Water Code §11.039.
- B. Persons requesting an exemption or variance from the provisions of this Plan shall file a petition with the Authority within 5 days after the Plan implementation or for a particular drought response stage has been invoked. All petitions for variances shall be reviewed by the Director of Operations to insure the following



Information is included in the petition prior to submission to the Assistant General Manager/General Manager:

1. Name and address of the petitioner(s).
 2. Purpose of the water use.
 3. Specific provision(s) of the Plan from which the petitioner is requesting relief.
 4. Detailed statement as to how the specific provision of the Plan adversely affects the petitioner or what damage or harm will occur if the petitioner complies with the Plan.
 5. Description of relief requested.
 6. Period of time for which the exemption or variance is sought.
 7. Alternative water use restrictions or other measures the petitioner is taking or proposes to take to meet the intent of this Plan and the compliance date.
 8. Other pertinent information as may be requested.
- C. Exemptions and/or variances granted by the Authority shall be subject to the following conditions, unless waived or modified by the Assistant General Manager/General Manager:
1. Exemptions or variances granted shall include a timetable for compliance.
 2. Exemptions or variances granted shall expire when the Plan is no longer in effect, unless the petitioner has failed to meet specified requirements.
- D. No exemption or variance shall be retroactive or otherwise justify any violation of this Plan occurring prior to the issuance of the variance.

5.0 CONCLUSION

Sound management practices and good judgment are the essential mechanisms, which must be combined with a thorough working knowledge and experience of the water supply, treatment, and distribution facilities if we are to be accountable stewards of the water resources to which we are entrusted.



Since 1959, the Authority has maintained sight of its mission through providing strong leadership and wise water resource management to the general public throughout the Red River Basin. As a result of the majority of the natural water resources within the basin being unsuitable for human consumption due to excessive dissolved solids, the emphasis was placed on conservation of the existing groundwater and surface water supplies. A great deal of the Authority's resources have been expended over the past 50 years in efforts to make the public aware of the impending water shortages, assist in the development and conservation of additional water supplies, attempt to reclaim the contaminated natural water resources in that adequate water will be available to meet the population demands of the future, and combat man-made pollution to the water resources.

The Utility Division, in providing potable wholesale water service to the rural communities and municipalities which otherwise would not have had the opportunity to utilize the water resources available, is just one example. For many years conservation of the marginal water supplies that are available has been a way of life for residents of North Central and West Texas and is but another way of providing assurance to future generations that they will be able to enjoy the same way of life to which their forefathers were accustomed.

The adoption of this Conservation and Drought Contingency Plan by the Authority's Board of Directors establishes the official policy for long-term water conservation for the Utility Division. The Utility Division shall include all conservation components into future water use contracts executed by it and establish any conservation techniques not already in use as standard operating procedures. Language stating that should drought conditions occur, water will be distributed to all wholesale customers in accordance with Texas Water Code § 11.039. In addition, the Authority has provided copies of this plan to the following Regional Water Planning Groups whose areas encompass parts of the Utility Division's service area: the Panhandle Regional Water Planning Group, the Regional Water Planning Group - Area B, the Region C Water Planning Group, Brazos G Regional Water Planning Group and the Llano Estacado Regional Water Planning Group (Region O).

The Utility Division will, by all practical and legal means, provide enforcement to its customers of all contract terms and conditions to ensure general compliance of this Plan.

APPENDIX

**TABLE 3
UTILITY DIVISION RATE STRUCTURE**

SYSTEM IDENTIFICATION		POPULATION	SOURCE TYPE	EXISTING RATE STRUCTURE			COST / 10KG	PRODUCED (KG)	SOLD (KG)	TYPE OF ACTIVE CONNECTIONS				
SYSTEM NAME	PWS ID#			MINIMUM	BLK 1 PER K	BLK 2 PER K				DOMESTIC	COMMERCIAL	WHOLESALE	OTHER	TOTAL
TURKEY-ESTELLINE	0960001	270	G/S	59.00/2K	4.50>2K<7K	6.50>7K	\$ 101.00	19,967	15,237	151	8	0	0	159
CITY OF ESTELLINE	0960016			41.50 FLAT RATE						60	7	0	0	67
NEWLIN	0960016	54	S	45.75/2K	4.50>2K<7K	6.50>7K	\$ 87.75	9,201	6,415	29	1	0	0	30
HARREL'S CHAPEL		48	S	49.75/2K	4.50>2K<7K	6.75>7K	\$ 92.50	3,699	3,486	24	0	0	0	24
NORTHFIELD-CAREY	0380015	117	S	63.50/2K	5.00>2K<7K	8.25>7K	\$ 113.25	7,966	5,397	64	1	0	0	65
RURAL #1			S	30.50/2K	4.25>2K<7K	6.50>7K	\$ 71.25	1,450	1,450	10	0	2	0	12
NEW GOODLETT	0990003	41	S	52.50/2K	4.50>2K<7K	6.50>7K	\$ 94.50	3,779	2,250	26	1	0	0	27
QUANAHA-QUANAHA SW	0990044	90	S	48.25/2K	4.50>2K<7K	6.50>7K	\$ 90.25	2,626	2,387	45	0	0	0	45
RURAL #2			S	30.25/2K	4.50>2K<7K	5.75>7K	\$ 78.25	3,999	3,999	54	0	1	0	55
OLD GOODLETT	0990012	56	S	40.50/2K	4.50>2K<7K	6.50>7K	\$ 82.50	2,790	2,415	29	7	0	1	37
MEDICINE MOUND	0990013	96	S	61.50/2K	4.50>2K<7K	6.25>7K	\$ 102.75	18,405	17,552	43	5	0	0	48
QUANAHA NORTHEAST	0990004	260	S	50.50/2K	4.50>2K<7K	6.50>7K	\$ 92.50	10,826	8,652	102	2	0	0	104
KIRKLAND LAZARE	0380012	128	S	53.25/2K	4.75>2K<7K	6.75>7K	\$ 97.25	8,293	4,988	71	0	0	1	72
LOCKETT	2440008	688	G	68.00/2K	5.00>2K<7K	8.00>7K	\$ 117.00	31,020	17,416	270	5	0	0	275
BOX	2440006	128	G	36.50/2K	3.75>2K<7K	6.50>7K	\$ 74.75	11,209	10,537	49	2	0	0	51
HINDS	2440005	175	G	61.00/2K	4.50>2K<7K	6.75>7K	\$ 103.75	10,321	5,382	67	3	0	0	70
FARMERS VALLEY	2440007	140	G/S	45.50/2K	3.50>2K<7K	4.75>7K	\$ 77.25	9,565	5,564	55	1	0	0	56
TELL CEE-VEE	0380013	388	S	53.25/2K	4.50>2K<7K	6.00>7K	\$ 93.75	27,834	15,988	192	2	0	0	194
CHILDRESS CO NE	0380014	295	S	50.75/2K	4.50>2K<7K	6.50>7K	\$ 92.75	14,321	10,257	118	0	0	0	118
CHILDRESS SAIED	0380019	68	S	40.25/2K	4.00>2K<7K	5.75>7K	\$ 77.50	2,327	2,176	27	0	0	0	27
CHILDRESS SAIED				25.00 FLAT RATE						25	0	0	0	25
GARDEN VALLEY	0380017	116	S	46.00/2K	3.50>2K<7K	5.25>7K	\$ 79.25	6,002	4,417	56	2	0	0	58
RURAL #3				30.00/2K	4.25>2K<7K	6.50>7K	\$ 70.75	976	976	14	0	1	0	15
GUTHRIE DUMONT	1350001	330	G	46.25/2K	3.75>2K<8K	5.50>10K	\$ 76.25	29,226	18,350	121	11	0	0	132
FOARD CO RURAL	0780014	120	S	59.00/2K	4.75>2K<7K	5.75>7K	\$ 100.00	10,523	10,609	120	1	0	0	121
TRUSCOTT GILLILAND	1380006	176	G	66.25/2K	5.75>2K<7K	7.50>7K	\$ 117.50	18,214	8,533	96	2	0	0	98
SAMNORWOOD	0440016	146	G	64.00/2K	4.75>2K<7K	7.25>7K	\$ 109.50	18,092	8,133	72	1	0	0	73
DODSON	0440018	218	G	51.50/2K	4.00>2K<7K	6.50>7K	\$ 91.00	20,126	13,386	109	0	0	0	109
PLASKA FRIENDSHIP/DONLEY CO.	0650018	36	S	69.00/2K	4.50>2K<7K	8.00>7K	\$ 115.50	5,246	3,980	16	2	0	0	18
CLUB LAKE/MEMPHIS	0960019	74	S	68.25/2K	6.00>2K<7K	8.00>7K	\$ 122.25	1,912	963	37	0	0	0	37
CITY HOWARDWICK	0650004	790	G	40.75/2K	3.50>2K<7K	5.00>7K	\$ 82.25	22,007	7,959	313	3	0	0	316
GREENBELT LAKE LOTS	0650014	195	S	41.50/2K	4.25>2K<7K	6.50>7K	\$ 121.00	7,958	3,762	77	1	0	0	78
ARROWHEAD LAKE LOTS	0390021	1625	S	73.50/2K	5.00>2K<7K	7.50>7K	\$ 121.00	56,099	29,766	644	6	0	0	650
ARROWHEAD RANCH EST				63.00 FLAT RATE						76	0	0	0	76
RINGGOLD	1690005	170	G	56.00/2K	4.50>2K<7K	6.25>7K	\$ 97.25	5,097	3,552	67	1	0	0	68
PRESTON SHORES	0910037	1740	S	53.00/2K	4.50>2K<7K	6.75>7K	\$ 82.00	101,285	85,423	668	28	2	0	698

TABLE 4, continued
RRA Guthrie-Dumont Water System
EMERGENCY TRIGGER CRITERIA

(Expressed in Millions of Gallons)

DISTRIBUTION		WATER SALES		SOURCES SUPPLIED		
Month	Active Meters	Average Day	Total Sold	Produced	Gross Losses	% Losses
October	134	0.033	0.979	1.501	0.521	34.71%
November	133	0.035	1.037	1.454	0.418	28.75%
December	133	0.039	1.184	1.552	0.368	23.71%
January	133	0.032	0.955	2.297	1.342	58.42%
February	132	0.020	0.609	1.120	0.512	45.71%
March	133	0.027	0.796	1.078	0.282	26.16%
April	133	0.031	0.926	2.213	1.251	56.53%
May	134	0.079	2.363	2.929	0.565	19.29%
June	133	0.060	1.795	1.975	0.180	9.11%
July	133	0.103	3.100	3.112	0.012	0.39%
August	132	0.096	2.871	6.998	4.126	58.96%
September	132	0.057	1.699	2.998	1.300	43.36%
Monthly Averages	133	0.051	1.526	2.436	0.906	37.22%
FY 08 - 09	129	0.052	19.124	30.381	11.256	37.05%
FY 09 - 10	129	0.044	16.241	22.387	6.146	27.45%
FY 10 - 11	133	0.073	26.565	31.485	4.921	15.63%
FY 11 - 12	134	0.051	18.554	26.573	8.020	30.18%
FY 12 - 13	132	0.050	18.350	29.226	10.876	37.21%
Yearly Averages	131	0.054	19.767	28.010	8.244	29.43%
Average Daily Production				0.077		

TRIGGER CRITERIA

Water Supply	GPM	GPD
East Well	55.0	79,200
South Well	55.0	79,200
North Well	35.0	50,400
Total	145.0	208,800
Safe Yield	101.5	146,160

Pumping Capacities (GPD)	Stage 1 Trigger	Stage 2 Trigger	Stage 3 Trigger	Stage 4 Trigger
146,160	116,928	93,542	74,834	59,867

TABLE 4, continued
RRA Samnorwood Water System
EMERGENCY TRIGGER CRITERIA

(Expressed in Millions of Gallons)

DISTRIBUTION		WATER SALES		SOURCES SUPPLIED		
Month	Active Meters	Average Day	Total Sold	Produced	Gross Losses	% Losses
October	73	0.015	0.460	1.515	1.055	69.64%
November	74	0.019	0.568	1.579	1.011	64.03%
December	74	0.028	0.833	1.637	0.804	49.11%
January	73	0.018	0.542	1.714	1.172	68.38%
February	73	0.011	0.325	1.554	1.229	79.09%
March	73	0.018	0.546	1.371	0.825	60.18%
April	73	0.022	0.660	1.548	0.888	57.36%
May	78	0.033	0.983	1.512	0.529	34.99%
June	74	0.022	0.651	1.451	0.800	55.13%
July	74	0.034	1.013	1.561	0.548	35.11%
August	74	0.033	1.001	1.441	0.440	30.53%
September	74	0.018	0.551	1.209	0.658	54.43%
Monthly Averages	74	0.023	0.678	1.508	0.830	55.05%
FY 08 - 09	75	0.020	7.463	21.558	14.095	65.38%
FY 09 - 10	76	0.023	8.318	18.322	10.004	54.60%
FY 10 - 11	77	0.026	9.439	21.683	12.244	56.47%
FY 11 - 12	73	0.023	8.246	19.373	11.127	57.44%
FY 12 - 13	74	0.022	8.133	18.092	9.959	55.05%
Yearly Averages	75	0.023	8.320	19.806	11.486	57.99%
Average Daily Production				0.054		

TRIGGER CRITERIA

Water Supply	GPM	GPD
North Well	58	83,520
South Well	60	86,400
Total	118	169,920
Safe Yield	82.6	118,944

Pumping Capacities (GPD)	Stage 1 Trigger	Stage 2 Trigger	Stage 3 Trigger	Stage 4 Trigger
118,944	95,155	76,124	60,899	48,719

TABLE 5
Utility Division Water Use Characteristics
(Treated Water in Million Gallons)

Fiscal Year	Domestic	Treated		Raw	Total	Monthly	Daily
		Commercial	Wholesale				
2009	266.33	28.57	83.24	45.16	423.30	35.28	1.16
2010	249.93	29.01	88.05	46.46	413.45	34.45	1.13
2011	323.42	36.26	120.31	53.34	533.33	44.44	1.46
2012	248.51	32.15	94.25	48.67	423.58	35.30	1.16
2013	230.79	30.59	80.93	9.83	352.14	29.35	0.96
Average	263.80	31.32	93.36	40.69	429.16	35.76	1.18

High Volume Retail Customers

Customer	Location	Avg Use	Wholesale/		Customer	Location	Avg Use	Wholesale/
			Commercial	Commercial				
1. Southwest Water Co.	Grayson	3,829,133	W		6. Guthrie School	King	201,897	C
2. AEP Oklaunion	Wilbarger	454,617	C		7. American Legion	Grayson	179,241	C
3. City of Chillicothe	Hardeman	983,750	C		8. Cornerstone Marine Group	Grayson	255,158	C
4. Texas DOT	Donley	260,367	W		9. Rickey L. Smith Ranches	Hall	151,141	C
5. Vest Ranch	Hall/Collingsworth	261,502	C		10. David Pickerill	Collingsworth	117,038	C

**TABLE 6
HISTORICAL WATER USE DATA**

SYSTEM NAME	SOURCE	FY 12-13		FY 11-12		FY 10-11		FY 09-10		FY 08-09	
		PROD	SOLD								
Turkey-Estelline	G/S	19,967	15,237	20,458	16,323	27,540	20,908	21,971	16,059	23,119	17,246
Newlin	S	9,201	6,415	9,141	7,305	11,538	9,385	9,964	7,749	9,026	6,344
Harrels Chapel	S	3,699	3,486	3,097	2,518	5,131	4,491	4,316	3,734	3,338	2,722
Carey-Northfield	S	7,966	5,397	7,462	5,698	11,023	9,063	8,468	6,233	11,012	6,511
Rural #1	S	1,450	1,450	1,549	1,549	1,641	1,641	1,076	1,076	1,604	1,604
New Goodlett	S	3,779	2,250	2,453	1,751	3,168	2,418	3,195	1,828	3,147	1,975
Quanah Southwest	S	2,626	2,387	2,471	2,182	4,043	3,678	4,033	3,367	4,192	3,409
Rural #2	S	4,000	4,000	4,332	4,332	7,469	7,469	4,633	4,633	6,177	6,177
Old Goodlett	S	2,790	2,415	1,932	1,929	3,321	2,993	3,210	2,481	2,873	2,672
Medicine Mound	S	18,405	17,552	20,303	18,698	23,255	21,961	22,302	21,499	23,497	21,723
Quanah Northeast	S	10,826	8,652	11,042	8,634	13,905	11,504	11,818	9,605	13,414	13,034
Kirkland-Lazare	S	8,293	4,988	8,014	5,326	10,800	7,558	9,003	5,948	8,396	5,763
Lockett	G	31,020	17,416	38,383	18,707	31,241	22,079	31,957	19,430	32,880	19,185
Box	G	11,209	10,537	13,810	12,364	16,527	13,704	11,996	10,905	12,257	11,605
Hinds	G	10,321	5,382	9,958	5,583	12,477	8,957	12,252	6,266	11,980	5,763
Farmers Valley	G/S	9,565	5,564	12,264	6,910	13,498	8,151	8,098	5,154	11,019	5,908
Tell Cee Vee	S	27,834	15,988	26,439	15,309	30,810	20,016	27,713	15,952	28,039	14,988
Childress NE	S	14,321	10,257	14,321	8,865	15,373	13,103	12,558	10,192	13,242	9,702
Saied	S	2,327	2,176	2,721	2,587	3,558	3,172	2,955	2,709	3,034	2,543
Garden Valley	S	6,002	4,417	5,183	4,228	8,078	6,561	7,201	6,264	7,028	5,396
Rural #3	S	976	976	1,075	1,075	1,287	1,287	1,082	1,082	1,052	1,052
Guthrie-Dumont	G	29,226	18,350	26,573	18,554	31,458	26,565	22,387	16,241	30,381	19,124
Foard County	S	10,523	10,609	12,847	12,648	18,147	16,677	14,000	9,073	16,459	12,246
Truscott-Gilliland	G	18,214	8,533	16,494	9,922	17,149	11,481	11,976	6,021	13,933	8,759
Samnorwood	G	18,092	8,133	19,373	8,246	21,683	9,439	18,322	8,318	21,558	7,463
Dodson	G	20,126	13,386	25,369	12,726	27,796	16,591	29,087	13,635	29,760	12,960
Plaska Friendship/Donley County Rest Area	S	5,246	3,980	4,727	3,527	5,401	3,313	4,212	3,521	4,260	3,270
Club Lake-Memphis NE	S	1,912	963	2,327	1,456	2,340	1,362	6,118	1,208	5,609	1,466
Howardwick	G	22,007	7,959	34,074	13,467	45,009	15,831	28,382	13,546	29,530	17,835
Greenbelt Lake Lots	S	7,058	3,762	8,550	4,797	10,891	6,885	10,036	6,504	10,117	8,002
Arrowhead Lake Lots	S	56,099	29,766	71,096	36,920	77,397	51,450	56,979	37,464	60,128	40,439
Ringgold	G	5,097	3,552	5,790	3,468	8,488	4,387	7,505	3,896	6,939	4,140
Lake Texoma	S	9834	9834	48675	48675	53,338	53,338	46,460	46,460	45,164	45,164
Preston Shores	S	101,285	85,423	116,378	95,840	137,407	116,851	96,062	84,924	90,654	75,851
Total Utility System Water Use		511,296	351,192	608,681	422,119	712,187	534,269	571,327	412,977	594,818	422,041

EXHIBIT 1

BOARD OF DIRECTORS

RESOLUTION



RED RIVER AUTHORITY OF TEXAS



RESOLUTION

STATE OF TEXAS §

COUNTY OF WICHITA §

A **RESOLUTION OF THE BOARD OF DIRECTORS** adopting the amended Water Conservation and Drought Contingency Plan; establishing water conservation goals and policy including water accountability, acceptable plumbing practices, public education, and enforcement; establishing criteria and policy for initiating and termination of drought response stages, including restrictions on certain water uses, penalties for the violations of and provisions for enforcement of the restrictions, procedures for granting variances, and providing severability and effective dates.

WHEREAS, the Red River Authority of Texas (Authority) is a governmental agency and political subdivision of the State of Texas created and functioning as a conservation and reclamation district (under Article XVI, Section 59 of the Texas Constitution) pursuant to Article 8280-228 of Vernon's Annotated Texas Civil Statutes (VATCS) as amended; and

WHEREAS, as a part of the enabling legislation, the Authority provides potable water and wastewater treatment services to the general public through multiple water and wastewater systems located throughout the territorial jurisdiction; and

WHEREAS, the Authority recognizes that the amount of water available to the Authority and its customers is limited and subject to depletion, as a result of natural limitations including conditions of drought and other acts of God; and

WHEREAS, Section 11.1271 through Section 11.1272 of the Texas Water Code and applicable rules of the Texas Commission on Environmental Quality under Title 30, Chapter 288 of the Texas Administrative Code require all public water systems in Texas to prepare a Water Conservation and Drought Contingency Plan; and

WHEREAS, the Authority has maintained a Water Conservation and Drought Contingency Plan since 1988; and

WHEREAS, as authorized under law, and in the best interest of the public, the Board of Directors deems it expedient and necessary to amend the Water Conservation and Drought Contingency Plan establishing certain rules and policies for the orderly and efficient conservation and management of its limited water resources;

NOW, THEREFORE BE IT RESOLVED by the Board of Directors that:

Section 1.

The Authority's amended Water Conservation and Drought Contingency Plan is adopted as the official water conservation and drought contingency policy of the Authority;

Section 2.

The General Manager is designated to enforce the provisions of the terms and provisions set forth in the Water Conservation and Drought Contingency Plan;

Section 3.

All policies that are in conflict with the provisions of the Water Conservation and Drought Contingency Plan be, and the same are hereby, repealed; and all other policies of the Authority not in conflict with the provisions of the Water Conservation Plan and Drought Contingency Plan shall remain in full force and effect;

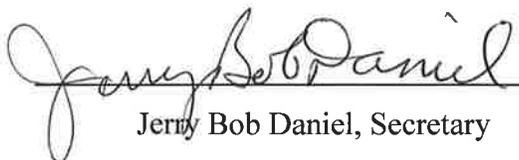
Section 4.

This Water Conservation and Drought Contingency Plan shall be effective immediately from and after the passage of this resolution.

PASSED AND APPROVED this the 16th day of April, 2014.



Cliff A. Skiles, Jr., DVM, President



Jerry Bob Daniel, Secretary

EXHIBIT 2

WATER SERVICE CONTRACTS



RED RIVER AUTHORITY OF TEXAS UTILITY DIVISION



WATER METER APPLICATION

District Number: _____ System: _____ Account Number: _____

Geographical Location: _____ Lot/Block Number: _____

Name: _____
(Last) (Middle) (First) (Driver's License Number)

Spouse: _____
(Last) (Middle) (First) (Driver's License Number)

Billing Address: _____

(City) (State) (Zip)

Home Phone Number: () _____ Work Phone Number: () _____

Email Address: _____

1. Do you own or rent the property? Own Rent
2. If renting, what is the owner's name? _____
3. Type of Service? Domestic Livestock
 Full Time Part Time Other _____
4. Sewerage Facilities Available? Yes No
5. Type of Connection: New Tap Long Short
 Existing Tap Extension
6. Customer service inspection conducted? Yes No

The tap, set-up fee, inspection fee and customer valve will be \$755.00 (or the amount shown on the cost estimate in case of a long tap, extension, and/or sewerage service), and will **not** be refundable **unless** a meter cannot be set at the above-described location. In the event that service is being provided at an existing location, the total service connection costs will be calculated on the attached Domestic Water Service Contract. Additionally, a \$50.00 refundable deposit must be posted at the time a water service contract is executed, prior to the installation of a meter.

_____ (Date) _____ (Customer Signature)



RED RIVER AUTHORITY OF TEXAS



DOMESTIC WATER SERVICE CONTRACT UTILITY DIVISION

This Agreement made this the ____ day of _____, 20____, between the Red River Authority, an agency of the State of Texas, hereinafter called **AUTHORITY** and _____, hereinafter called **CONSUMER**.

WITNESSETH

- I. The **AUTHORITY** agrees to sell and deliver water from the Water Supply System, and the **CONSUMER** agrees to purchase and receive such water, to be used for domestic purposes, in accordance with the rules, regulations, rates, and prices fixed and adopted by the Board of Directors of the **AUTHORITY**.
- II. All water delivered to the **CONSUMER** shall be metered by a meter furnished, installed, and maintained by the **AUTHORITY**. The meter and/or the connection are for the sole domestic use of the **CONSUMER** and are to serve water to **ONLY** one dwelling and do **NOT** permit the extension of a pipe or pipes to transfer water from one dwelling or property to another; nor is it to share, resell, or sub-meter water to any other persons, dwelling, business, or property, without prior written approval of the **AUTHORITY**.
- III. The **AUTHORITY** shall have the right to locate a water service meter on the property of the **CONSUMER** at a point to be chosen by the **AUTHORITY**, and shall have access to the property and all associated equipment located upon said property at all reasonable times, for any purpose connected with or in the furtherance of its business operations, and, at termination of service, shall have the right to remove any or all of its equipment from the **CONSUMER's** property. Any and all livestock water tubs, out buildings or structures shall be located a minimum of 20 feet from the **AUTHORITY's** service meter.
- IV. The **CONSUMER** shall be responsible to:
 - A. Install and maintain, at his or her expense, a service line from the **AUTHORITY's** meter to the point of intended use.
 - B. Install and maintain an approved cut off valve and/or an approved back flow preventive device as required within one foot of said meter.
 - C. Promptly pay for all metered water and/or keep account current, whether water is used or not.
 - D. Promptly notify the **AUTHORITY** of any change in ownership or rental status of said property.
- V. The **CONSUMER** shall agree:
 - A. To observe and comply with all the **AUTHORITY's** rules and regulations now in effect or hereafter adopted.

- B. To promptly pay the **AUTHORITY**, at its main office in Wichita Falls, Texas, for all water received under this Contract, the monthly **MINIMUM**, whether water is used or not, on or before the 15th day of each month.
 - C. That the **AUTHORITY** will not accept partial payment of the monthly statement rendered.
 - D. That the **AUTHORITY** will not accept payment from anyone other than the **CONSUMER** without prior approval of the **AUTHORITY**,
 - E. That the **AUTHORITY may disconnect and cut off the water, without notice, upon breach of this Contract**, including the failure of the **CONSUMER** to pay, in full, the monthly statement rendered, and apply the posted deposit to any unpaid balance or indebtedness owed the **AUTHORITY** by the **CONSUMER**.
 - F. That in the event a shortage of water develops for any reason, the **AUTHORITY** may institute a Mandatory Curtailment Order and implement water rationing schedules among all consumers on the affected Water Supply System and prohibit the use of water for all other purposes, except that of life sustaining, until such time as the water shortage has passed and normal service restored. Any or all violators of a rationing request shall be subject to an immediate service disconnect together with a \$50.00 reconnect fee and other fees associated with the reinstatement of service.
- VI. The **CONSUMER** shall hold the **AUTHORITY** harmless from any and all claims or demands for damage to real or personal property occurring from the point the **CONSUMER** connects to the **AUTHORITY's** meter to the final destination or intended use. The **CONSUMER** further agrees to provide the **AUTHORITY** an easement or right-of-way for the purpose of installing, maintaining, and operating such pipelines, meters, valves and/or any other equipment the **AUTHORITY** may deem necessary, so executed on a separate form furnished by the **AUTHORITY** and attached here to, marked **EXHIBIT A**.
- VII. The **CONSUMER** shall agree to allow the **AUTHORITY's** representatives to enter the property to be served, for the purpose of performing a Customer Service Inspection of the **CONSUMER's** facilities for compliance with all applicable rules and regulations and plumbing codes, prior to making the initial connection, and periodically thereafter whenever the **AUTHORITY** would have reason to believe a violation may exist. The **CONSUMER** shall uncover and otherwise make available for inspection, at his or her own expense, all lines and other facilities requested by the **AUTHORITY's** representatives. Failure of the **CONSUMER** to comply with such a request or to correct any violation found as a result of an inspection shall be grounds for immediate severance of the connection. A severance shall remain in effect until any and all discrepancies have been corrected, and a reconnect fee of fifty (\$50.00) dollars plus all other fees associated with reinstatement of service, plus all incurred expenses, are paid to the **AUTHORITY**.

Unacceptable plumbing practices requiring immediate service include:

- A. Direct connections between the water system and any potential sources of contamination.
- B. Cross-connections between the water system and a private water system.
- C. Connections allowing water to be returned to the water system.
- D. Use of pipes or fittings containing more than 8% lead.
- E. The use of solder or flux containing more than 0.2% lead.

- VIII. The **AUTHORITY** shall provide the **CONSUMER** under this Contract, a **maximum** discharge rate at the meter of twenty (20 GPM) gallons per minute intermittent duty, not to exceed 10,000 gallons in any one 24-hour period. Should the demand become greater than 10,000 gallons in any one 24-hour period, the **CONSUMER** may make application for a commercial connection. The minimum discharge rate at the meter shall be at least 5 GPM, with a minimum of 20 psi pressure. Should the water system fail to provide at least the minimum discharge rate and pressure, this Contract shall be terminated at the option of either or both parties and a Disconnect Order issued within 24 hours after notification of the **CONSUMER**.
- IX. If sewerage facilities are available, service may be provided under the following conditions:
- A. **Gravity Sewer Tap:** where applicable the **AUTHORITY** will provide service and maintenance from the main lines to the customer's property line.
 - B. **Pressure Sewer Tap:** where applicable the **AUTHORITY** will provide service from the main to the sump tank to be located adjacent to the customer's septic tank to include maintenance of the pump. The customer is responsible for furnishing and maintaining electrical service for the pump and keeping the solids in the septic tank from entering the sump tank.
- X. The rate, fees, deposits, and miscellaneous charges in effect as of the date of this Contract are provided and attached for the **CONSUMER's** information and are subject to change by 30 days written notice. This contract is non-transferable.
- XI. The terms of this Contract shall be in effect as long as service is provided to the **CONSUMER**, but may be terminated by ten (10) days written notice of either party. To reinstate this Contract at an existing location, the fee shall be computed at the regular monthly rate, multiplied by the number of months since time of disconnecting, plus the reconnect fee, deposit, and any other fees associated with reinstatement of service.
- XII. Should the **owner** desire to **rent** his or her property and thereby transfer the burden of responsibility to that account, the **AUTHORITY** will **transfer** the account (temporarily) to the renter, providing:
- A. The customer elects to do so.
 - B. The customer's account is current.
 - C. The renter posts a \$50.00 Deposit and a \$50.00 Transfer Fee.

When a renter vacates the property, the **AUTHORITY** will transfer said account back to the **owner**, thereby transferring the responsibility for payment. **No contract will be executed with anyone other than the property owner except under the conditions listed above.**

SYSTEM RATE*	
Minimum Base: \$ _____	per month, with _____ gallons included**
Demand Block 1: \$ _____	per 1,000 gallons for the next _____ gallons
Demand Block 2: \$ _____	per 1,000 gallons over _____ gallons
Sewer Rate: \$ _____	per month (if applicable) ** (Payable if water is used or not)
FEES	
Short Tap (within 10 feet of main line)	\$ 675.00
Long Tap (the entire cost plus)	675.00
Account Set-up Fee	15.00
Reconnect or Transfer Fee	50.00
Domestic Gravity Sewer Short Tap Fee	300.00
Domestic Gravity Sewer Long Tap Fee (entire cost plus)	300.00
Domestic Pressure Sewer Tap Fee	1,600.00
DEPOSITS	
Standard Water Deposit (refundable)	\$ 50.00
Delinquent Account Deposit (refundable)	100.00
MISCELLANEOUS CHARGES	
Reinstatement Fee (calculated at system's minimum rate × number of months since disconnect, up to \$250 max)	\$ _____
Return Check Charge	25.00
Delinquent Collection Charge	35.00
Water or Sewer Service Charge/Call	35.00
Meter Accuracy Test (other than normal test)	35.00
Customer Service Valve	30.00
Customer Service Inspection Fee	35.00
CURRENT BALANCE DUE	\$ _____
TOTAL AMOUNT RECEIVED	\$ _____

Account # _____ Meter Serial # _____ Beginning Reading _____

System _____ District _____ Region _____

District Manager – Red River Authority of Texas _____ Property Owner or Renter _____

* Rates subject to change within 30 days notice.



RED RIVER AUTHORITY OF TEXAS UTILITY DIVISION



COMMERCIAL METER APPLICATION

District Number: _____ Account Number: _____

Geographical Location: _____ Lot/Block Number: _____

System: _____ System: _____

Name: _____
(Last) (First) (Middle) (Driver's License Number)

Billing Address: _____

(City) (State) (Zip)

Home Phone Number: () _____ Work Phone Number: () _____

Email Address: _____

- 1 Do you own or rent the property? Own Rent
- 2 If renting, what is the owner's name? _____
- 3 If commercial, type of business? _____
- 4 Name of business? _____
- 5 Will this connection be permanent? Yes No
- 6 If temporary, approximately how long? _____
- 7 If sewerage is available, is sewer requested? Yes No
- 8 Customer service inspection conducted? Yes No
- 9 Back flow prevention device required? Yes No

The tap, inspection fee and customer valve will be \$755.00 (or the amount shown on the cost estimate in case of a long tap, extension, and/or sewerage service), and will **not** be refundable **unless** a meter cannot be set at the above-described location. In the event that service is being provided at an existing location, the total service connection costs will be calculated on a case by case basis dependent upon the status of the existing account.

I understand that this commercial connection may be restricted or severed without notice if the demand jeopardizes any domestic customers from being served by this water and remain in said condition until such time as full service can be restored to all customers.

(Date) (Customer Signature)



RED RIVER AUTHORITY OF TEXAS



COMMERCIAL WATER SERVICE RESTRICTED DEMAND

This Agreement made this the _____ day of _____, 20____, between the Red River Authority of Texas, an agency of the State of Texas, hereinafter called **AUTHORITY** and _____, hereinafter called **CONSUMER**.

WITNESSETH

- I. The **AUTHORITY** agrees to sell and deliver water from the Water Supply System, and the **CONSUMER** agrees to purchase and receive such water, to be used for Restricted Commercial purposes, in accordance with the rules, regulations, rates, and prices fixed and adopted by the Board of Directors of the **AUTHORITY**.
- II. All water delivered to the **CONSUMER** shall be metered by a master meter furnished, installed, and maintained by the **AUTHORITY**. The meter and/or the connection are for the sole purpose as described in the attached statement marked Exhibit A and shall not be considered as a permit to transfer water from one property to another, nor share, resell, or sub-meter water to any other persons, dwelling, business, or property without prior approval of the **AUTHORITY**.
- III. The **AUTHORITY** shall have the right to locate a water service meter on the property of the **CONSUMER**, at a point to be chosen by the **AUTHORITY**, and shall have access to the property and equipment located upon said property at all reasonable times for any purpose connected with or in the furtherance of its business operations, and at termination of service shall have the right to remove any or all of its property from the **CONSUMER**'s premises.
- IV. The **CONSUMER** shall install, at his or her own expense, a service line from the point of intended use to include an approved cut off valve and an approved back flow prevention device, if required within one (1) foot of said meter and shall be responsible for all maintenance of the entire service line and metered water. The **CONSUMER** also agrees to provide copies of all certifications and inspection reports of back flow devices as required.
- V. The **CONSUMER** shall agree:
 - A. To observe and comply with all the **AUTHORITY**'s rules, plumbing codes, and regulations now in effect or hereafter adopted.
 - B. To promptly pay the **AUTHORITY**, at its main office in Wichita Falls, Texas, for water received under this contract, the monthly **MINIMUM** whether water is used or not, on or before the 15th of each month.
 - C. That the **AUTHORITY** may disconnect and cut off the water supply without notice upon breach of this agreement, including the failure of the **CONSUMER** to pay monthly statements rendered for water furnished.
 - D. The **AUTHORITY** may restrict, reduce, or sever the flow of water being delivered to the **CONSUMER** providing the demand exceeds any of the restrictions listed on the attached Exhibit B, or at any such time the domestic consumers being served by the Water System are placed in jeopardy and remain in said condition until such time as full service can be restored to all customers.

- VI. The **CONSUMER** shall hold the **AUTHORITY** harmless from any and all claims or demands for damage to real or personal property occurring from the point the **CONSUMER** connects to the **AUTHORITY's** meter to the final destination or intended use.
- VII. The **CONSUMER** shall agree to comply with all state and federal regulations regarding the transportation, delivery, consumption, and storage of water from a Public Water Supply.
- VIII. The **CONSUMER** shall agree to allow the **AUTHORITY's** representatives to enter the property to be served for the purpose of performing a Customer Service Inspection of the **CONSUMER's** facilities for compliance with all applicable rules and regulations prior to making the initial connection, and at such reasonable times thereafter whenever the **AUTHORITY** would have reason to believe a violation may exist. The **CONSUMER** shall uncover and otherwise make available for inspection all lines and other facilities requested by the **AUTHORITY's** representatives. Failure of the **CONSUMER** to comply with such a request or to correct any violation found as a result of an inspection shall be grounds for immediate severance of the connection. A severance shall remain in effect until any and all discrepancies have been corrected, and a reconnect fee of fifty dollars (\$50.00), along with all other fees associated with reinstatement of service, plus all incurred expenses, shall be paid to the **AUTHORITY**. Unacceptable plumbing practices requiring immediate severance include:
- A. Direct connections between the water system at any potential sources of contamination.
 - B. Cross-connections between the water system and a private water system.
 - C. Connections allowing water to be returned to the water system.
 - D. Use of pipes or fittings containing more than 8.0% lead.
 - E. The use of solder or flux containing more than 0.2% lead.
- IX. The **CONSUMER** shall be provided by the **AUTHORITY** under this contract a Maximum Discharge Rate at the meter of thirty-five gallons per minute (35 GPM) intermittent duty and not to exceed 20,000 gallons in any one 24-hour period. Should the demand be greater than 20,000 gallons in any one 24-hour period and the Water System is capable of such demand, the **CONSUMER** may provide on-site ground storage for peaking in an amount equal to fifty percent (50%) of the greatest demand during any 24-hour time period. Minimum Discharge Rate at the meter shall be five gallons per minute (5 GPM) continuous duty at 20 psi residual pressure. Should the Water System fail to provide at least the Minimum Discharge Rate, this contract shall be terminated at the option of either or both parties and a disconnect order issued within 24-hours after notification of the **CONSUMER**. **This contract is non transferable.**
- X. If sewerage facilities are available, service may be provided under the following conditions:
- A. **Gravity Sewer Tap:** where applicable the **AUTHORITY** will provide service and maintenance from the main lines to the customer's property line.
 - B. **Pressure Sewer Tap:** where applicable the **AUTHORITY** will provide service from the main to the sump tank to be located adjacent to the customer's septic tank to include maintenance of the pump. The **CONSUMER** is responsible for furnishing and maintaining electrical service for the pump and keeping the solids in the septic tank from entering the sump tank.

XI. The water rate for this Commercial Contract is as follows:

Connection Fee:	\$ 690.00	
Active Meter Transfer Fee	200.00	
Sewer Short Connection Fee (Gravity):	500.00	
Sewer Long Connection Fee (Gravity):	500.00	Cost Plus
Sewer Connection Fee (Pressure):	2,000.00	
Service Inspection Fee:	35.00	
Minimum:	85.00	
Demand Block 1:	6.75	/K gallons for next 30,000 gallons
Demand Block 2:	9.00	/K gallons for over 30,000 gallons
Sewer Rate (if applicable):	35.00	
Customer Valve	30.00	

RED RIVER AUTHORITY OF TEXAS	CONSUMER
<hr style="border: 0; border-top: 1px solid black; margin-bottom: 5px;"/> District Manager	<hr style="border: 0; border-top: 1px solid black; margin-bottom: 5px;"/> Agent For
<hr style="border: 0; border-top: 1px solid black; margin-bottom: 5px;"/> Regional Manager	<hr style="border: 0; border-top: 1px solid black; margin-bottom: 5px;"/> Purchaser
<hr style="border: 0; border-top: 1px solid black; margin-bottom: 5px;"/> System	<hr style="border: 0; border-top: 1px solid black; margin-bottom: 5px;"/> Account Number
<hr style="border: 0; border-top: 1px solid black; margin-bottom: 5px;"/> Meter Serial Number	<hr style="border: 0; border-top: 1px solid black; margin-bottom: 5px;"/> Beginning Reading

**RED RIVER AUTHORITY OF TEXAS
COMMERCIAL WATER SERVICE**

EXHIBIT A

Intended Use:

The **CONSUMER** proposes to use an estimated _____ gallon per day (GPD) on an average for the purpose of _____

Anticipated Peak Demand:

Multiply the average known or estimated daily consumption that would pass through this metering point by a factor of 2.5 to determine the Peak Demand.

Average Consumption _____ GPD × 2.5 = _____ GPD Peak

EXHIBIT B

Restrictions:

1. Limited to any other terms and conditions as set forth by the Texas Commission on Environmental Quality.
2. Reduced flow shall be as much as necessary to maintain normal service to all domestic customers on the system supplying this commercial service.
3. Private multiple service on the part of the **CONSUMER** shall not exceed _____ separate single-family dwellings of a domestic classification.
4. Section IX of this contract shall be applicable with regard to discharge rate of flow at the meter.

EXHIBIT 3

**OTHER SOURCE WATER SUPPLIERS'
WATER CONSERVATION AND DROUGHT
CONTINGENCY PLANS**

RED RIVER AUTHORITY OF TEXAS
WATER SYSTEMS THAT PURCHASE WATER
SYSTEMS THAT WILL FOLLOW OTHER DROUGHT CONTINGENCY PLANS

SYSTEM NAME	ID #	WATER PROVIDER	WATER TYPE
TURKEY/ESTELLINE	0960001	GMIWA / CITY OF TURKEY	S / G
NEWLIN	0960016	GMIWA	S
HARREL'S CHAPEL	PRIVATE	GMIWA	S
NORTHFIELD-CAREY	0380015	GMIWA	S
RURAL #1		GMIWA	S
NEW GOODLETT	0990003	GMIWA	S
QUANAH SOUTHWEST	0990044	GMIWA	S
RURAL #2		GMIWA	S
OLD GOODLETT	0990012	GMIWA	S
MEDICINE MOUND	0990013	GMIWA	S
QUANAH NORTHEAST	0990004	GMIWA	S
KIRKLAND-LAZARE	0380012	GMIWA	S
LOCKETT	2440008	CITY OF VERNON	G
BOX	2440006	CITY OF VERNON	G
HINDS	2440005	CITY OF VERNON	G
TELL CEE VEE	0380013	GMIWA	S
CHILDRESS NORTHEAST	0380014	GMIWA	S
SAIED	0380019	GMIWA	S
GARDEN VALLEY	0380017	GMIWA	S
RURAL #3		GMIWA	S
FOARD COUNTY	0780014	GMIWA	S
DONLEY COUNTY REST AREA/PLASKA-FRIENDSHIP	0650018	GMIWA	S
CLUB LAKE/MEMPHIS NE	0960019	GMIWA	S
GREENBELT LAKE LOTS	0650014	GMIWA	S
ARROWHEAD LAKE LOTS	0390021	CITY OF WICHITA FALLS	R
PRESTON SHORES	0910037	USACE - LAKE TEXOMA	R

GMIWA = GREENBELT MUNICIPAL AND INDUSTRIAL WATER AUTHORITY

S = TREATED SURFACE WATER

G = TREATED GROUNDWATER

R = RAW SURFACE WATER

